ROADS AND UTILITY INVENTORY

Introduction

Information for the roads and utility inventory was developed from the **South Mountains State Park General Management Plan** (GMP) (*NC DEHNR*, 1993). The GMP based its information on "an inspection of the park facilities in October 1992, as well as on original construction drawings, and information from NC Division of Parks and Recreation staff and the Institute for Transportation Research and Education's study on roads." Information on new facilities built or renovated since the GMP was published has been provided by park staff or delineated in the field.

Existing Roads

There are approximately $2^2/5$ miles of paved roads along South Mountain Park Avenue. There are over 42 miles of unpaved roads/ trails in the park.

The main entrance road is a paved asphalt and macadam road approximately 18-20 feet wide, with varying shoulder widths.

Of the 30 miles of unpaved roads, 287/10 miles are single lane (eight to 11 feet wide) fire access roads and bridle trails. Most of these roads were in existence prior to acquisition of the land by the NC Division of Parks and Recreation, and some areas of these roads are heavily eroding due to steep slopes. The park staff has added numerous water bars and water trail ditches to help address this erosion, with some success. However, there are still areas where erosion has not been resolved. The park staff maintains these roads using park equipment.

Maintenance of South Mountain Park Avenue (SR 1904) from the superintendent's residence to the Jacob Fork parking lot is part of the State Parks Road System. There is a request in to the NC Department of Transportation (NC DOT) to abandon the rest of the road within park property behind the new park gate and turn it over to the State Parks Road System. At the time of printing of this document, this transfer had not yet taken place.



Water bar on High Shoals Fall Loop



Bridge along South Mountain Park Avenue

Currently, there are three new bridges along South Mountain Park Avenue which span Jacob Fork. These bridges are constructed to NC DOT standards and are two lanes with guard rails. Another one-lane vehicular bridge in the park connects the horsetrailer parking area to the existing equestrian campground.

Pipe culverts along the park roads are both concrete and corrugated metal, but the majority of the piping is metal. Most are in fair shape. Minor tail ditching is required on several culverts.

Existing Parking Areas

The new visitor center has 35 paved parking spaces for use by the public. This includes two accessible parking spaces. A lower park-



Horse trailer parking, January 2007



Jacob Fork Parking Area

ing lot provides five staff parking spaces. The main parking lot also has four bus parking spaces.

The paved parking lot at the day-use area (Jacob Fork parking area) has 149 designated parking spaces. There are four accessible spaces in this parking lot. This parking lot is in good condition and is striped with signage to mark the travel ways.

On busy weekends, the Jacob Fork parking lot is full. The park staff manages the parking in 44 additional spaces (including one accessible space) in the Cicero Branch parking lot located to the west of the existing primitive campground. This parking lot also serves as access for those fishing in Jacob Fork. Seven additional parking spaces exist off of South Mountain Park Avenue, one

group of three and one group of four. These are primarily used by those fishing in Jacob Fork as well as for access to Turkey Ridge Trail

Existing Sewer Systems

All sewer facilities at South Mountains State Park have septic tanks and separate drain fields. Descriptions of the systems follow:

Picnic Area Toilet Building (Building #031-004).

This system has a 2,000-gallon, pre-cast septic tank with a five-line distribution box. There are five 140-linear-foot nitrification lines. The nitrification field is located approximately 25 feet behind the toilet building in a wooded area. Picnic tables are located in the drainfield. A gravel interceptor drainage ditch above the drainfield catches surface water that runs across it. The septic tanks do not have risers.

Ranger Residence (Building #031-002).

The size and age of this system is unknown, but it is probably a 1,000-gallon tank with approximately three 100-foot drainfield lines. The tank does not have a riser.

Ranger Residence (Building #031-022).

The size and age of this system is unknown.

Superintendent's Residence (Building #031-018).

The size and age of this system is unknown, but it is likely a 1,000-gallon tank. This tank does have a riser.

Privies.

There are 12 privies at South Mountains State Park. Four of the privies are vault/pump-out and are located at the 11-site primitive campground and the horse trailer parking area. The remaining eight are pit privies and are located at the hike-in group and primitive campsites.

There are no public restrooms at the former office and maintenance area.

Visitor Center Sewer System.

The visitor center toilet facilities are served by approximately 900 linear feet of field line, a 3,000-gallon septic tank, and a 1200-gallon pump tank which doses approximately 250 gallons. The septic field is located to the northeast of the visitor center building.

Equestrian Campground Washhouse Sewer System (Building #031-028).

This septic system consists of six flush toilets, two urinals, and four shower stalls. The septic field is located to the north of the site. This is currently the only pumped system in the park.

Existing Water Systems

The seven water systems that serve the park are each supplied by potable wells with submersible pumps.

Picnic Toilet Building Water System (Building #031-004). This system is served by a 302-foot deep, six-inch diameter well

with a flow rate of 24 gallons per minute. The well is located about 200 feet north of the picnic toilet building. The pump control, storage tank, and chlorinator are located inside the toilet building. The pump is a submersible pump of unknown horsepower. The water quality is fair with a high sulphur content.

Ranger Residence Water System (building #031-002).

This system is served by a well of unknown age with an estimated depth of 120 feet. The piping and jet pump were replaced about 1985. The well supplies only the ranger residence, picnic shelter, and the former park office. The pump house is located just west of the ranger residence.



Potable Water in the Equestrian Campground

Ranger Residence Water System (building #031-022). This system is served by a well of unknown age and depth.

Superintendent's Residence Water System (Building #031-018). This system is served by a water well of unknown age and depth. It is a six-inch diameter drilled well with an estimated depth of 150 feet. The water has a high sulphur content. A submersible pump of unknown horsepower pumps the water.

Visitor Center Water System.

This system consists of a well located approximately 100 feet from the northeast corner of the building and is served by a 7.5-horse-power pump.

Equestrian Campground Washhouse Water System (Building #031-028).

This system is served by a well just to the south of the day use horsetrailer parking lot, on the north side of Jacob Fork.

Primitive Campground Water System.

This system is of unknown age and depth.

Existing Electrical System

Rutherford Electric Membership Corporation in Morganton provides electrical power to the park. Underground single phase power lines run along the South Mountain Park Avenue road shoulder to a series of transformers located along this entry road. The line ends at the picnic area toilet building.

Existing Telephone System

AT&T in Morganton provides phone service to the park. The phone line runs underground along the South Mountain Park Avenue road shoulder. A 25-pair line services the visitor center and a 25-pair line services the rest of the park. The visitor center has three voice lines, one fax line, one fire alarm line, and one elevator line. A pay phone is planned for the visitor center in the near future. The maintenance area and former park office have one voice line and one pay phone. There are three phone extensions in the office and shop area, and each ranger residence has its own phone line.